STATEMENT OF KEITH COLLINS
CHIEF ECONOMIST, U.S. DEPARTMENT OF AGRICULTURE
BEFORE THE U.S. HOUSE COMMITTEE ON AGRICULTURE
SUBCOMMITTEE ON DEPARTMENT OPERATIONS, OVERSIGHT, NUTRITION AND FORESTRY
May 20, 2003

Mr. Chairman and Members of the Subcommittee, thank you for the invitation to this hearing to provide information on the economic situation in the U.S. dairy industry. We all know that the market for milk has been very variable in recent years, with milk prices rising to high levels two to three years ago and then dropping to 25-year lows at the present time. I will provide our current assessment of the market situation for milk and dairy products, describe the recent production trends and assess the role of government programs in providing assistance to the nation's milk producers.

Milk Production Increases Slowing but Still Strong

The current dairy situation has strong ties to the 1996-2001 period when returns for dairy producers were fairly strong. The returns of that period provided incentives to expand production. However, those incentives were not realized during 2001 when poor weather adversely affected forage supplies and production per cow, and U.S. milk production declined 1.2 percent to 165.5 billion pounds. That was the largest annual drop since 1984, when the Federal government paid producers to reduce milk production. The production drop triggered a 21-percent increase in the all-milk price to $15.04 per cwt, the second highest ever.

In 2002, milk production resumed its upward path, increasing 2.6 percent to 169.8 billion pounds. Milk production grew at twice the rate of the previous 10 years, as producers responded to increased milk prices in 2001, and weather conditions helped improve forage and animal productivity. Milk cow numbers grew during most of 2002, going from below year earlier levels at the start of the year to about 0.5 percent higher during the last quarter. In addition, milk output per cow rose 2.4 percent. The increase in output per cow, appearing large, represents only a 2 percent gain between 2000 and 2002, probably restrained by 2002's variable forage supplies, the lower milk prices caused by the milk production increase, and higher costs for feed.

On May 12, the Department of Agriculture (USDA) released new forecasts of milk production and use for the 2002/2003 marketing year that began October 1, 2002, and the first projections for 2003/2004. The figures show 2002/03 milk production slowing to a 1 percent increase to 170.9 billion pounds, and 2003/04 production up 1 percent to 172.6 billion pounds.

Dairy cows in 2002/03 are expected to average 9.13 million head, unchanged from 2001/02. Cow numbers are expected to begin declining year over year, starting with the second quarter of 2003. During 2003/04, cow numbers are then expected to decline about 1.5 percent to just below 9 million head. The decline in cow numbers is expected to result from low returns to producers, which is slowing expansion, and from more producers exiting from dairying. Up to now, the higher returns from earlier years plus the payments from the Milk Income Loss Contract (MILC) Program have likely led producers, especially those with smaller herds, to limit cow liquidations and farm exits.

Early in 2002, with milk prices just surpassing $15 per cwt, producers were encouraged to expand herds. At that time, replacement heifer supplies were tight and prices were being bid up. In

April 2002, the average price for dairy replacement heifers was $1,710 per head, and the tight supplies probably restrained the increase in the nation's dairy herd that occurred.

For 2003, the average price of replacement heifers in April was $1,300 per head, a 24-percent drop from a year ago. The rise and then the drop in replacement heifer prices suggests many heifers have been added to herds and that the incentive to add more has slowed. In addition, dairy cow slaughter is 15 percent above a year earlier through April of this year, reflecting the poorer returns and large numbers of dairy replacement heifers available. Producers are culling their poorer cows, and replacing them with more productive heifers. The increasing slaughter suggests cow numbers will decline this year, and milk per cow increases may be restrained as there will be more first-calf heifers in the herd. However, the added replacements could bolster milk output per cow in 2004.

With low milk-feed price ratios, erratic forage quality in 2002, and sizeable heifer replacement, milk per cow in 2002/03 is forecast to rise just 1 percent over the previous year. Milk per cow in 2003/04 is expected to grow about 3 percent despite continued low milk-feed price ratios.

Production Trends Continue–Western Expansion and Larger Operations

Milk production continues to shift by region and farm size. The number of dairy operations in the United States has been declining, most noticeably among small operations. For example, while the total number of milk cow operations declined 21 percent between 1998 and 2002, the number of operations with fewer than 200 head declined 23 percent, while operations with 500 head or more head increased 20 percent. As a result, in 2002, operations with 500 head or more were responsible for 37 percent of the U.S. dairy cow inventory and almost 42 percent of milk production, compared with 27 percent and 30 percent, respectively, 5 years ago.

Geographically, milk production has been shifting to the West, although there has been some expansion in some Midwestern states with the arrival of large dairy operations. In 1998, 3 western states, California, the nation's largest producer, Idaho and Washington, were in the top 10 producing states and responsible for almost 25 percent of U.S. milk production. By 2002, these 3 states produced almost 29 percent of U.S. milk, and New Mexico had joined the ranks of the top 10 producing states. Wisconsin, Minnesota, and Michigan have remained in the top 10 but their share of milk production declined from 24 percent in 1998 to 21 percent in 2002. In addition, Ohio has fallen from the list of top 10 producing states since 1998. In the East, New York and Pennsylvania have retained their ranks as the third and fourth largest producers, but their share of national production has fallen slightly.

Commercial Use Weak, Stocks Building

After notable increases in the late 1990s, commercial use of milk weakened in late 2001 and continued to be sluggish in 2002. Measured on a milk fat basis, use increased less than 1 percent during the 2001/02 marketing year compared with the prior year. Sales were slow despite the surge in milk production and declining wholesale prices. Retail prices also dropped below year-earlier levels during the second half of 2002. The U.S. economic slowdown, rising unemployment and consumer spending patterns all adversely affected food service sales. Sales of cheese, butter and fluid cream, particularly pizza cheese, were all weak.

Sales of butter and American cheese rose only 1 percent in 2002. Sales of other cheeses posted a much stronger increase of nearly 4 percent. Faced with increased competition from imported

milk proteins and little apparent change in food processing formulations despite low prices, commercial use of nonfat dry milk fell more than a fifth. Sales of fluid milk and ice cream rose slightly.

As milk production bounced back in 2002, production of manufactured dairy products rose. Total cheese production was up 4 percent, butter production rose 10 percent, and nonfat dry milk production increased 7 percent. The increases in cheese and butter production, in the face of weak demand, has led to sharp increases in inventory. At the start of the 2002/03 marketing year, butter stocks were 89 percent above a year earlier, and cheese stocks were 6 percent higher. Commercial stocks of all products on a milkfat basis were record high in early 2003. Meanwhile, the Commodity Credit Corporation (CCC) continued to accumulate nonfat dry milk stocks in government inventory.

Growth in dairy product demand is expected to improve in 2003. The U.S. economy is expected to strengthen as the year unfolds, and unemployment may begin to decline. These developments should help food service and grocery store sales. However, the demand growth probably will not be enough to meet the increase in milk production, reduce the large stocks and boost prices appreciably. Demand for fluid milk and soft products probably will continue flat, as sales of these products appear to be little affected by prices or the state of the U.S. economy.

For the 2002/03 marketing year, USDA estimates that commercial use of milk will rise 1.5 percent, slightly above the increase in production. Commercial use of dairy products in 2003/04 is expected to rise about 2.5 percent as low prices and a healthier economy stimulate sales, especially in restaurant and food processing markets.

Rising Production, Large Stocks, Weak Use Mean Lower Prices

Wholesale prices for manufactured products began to decline in 2001/02, as commercial use languished at less than 1 percent above the previous year and skim-solids use declined fractionally. On the Chicago Mercantile Exchange, the average cheese price fell from $1.36 per pound in 2000/01 to $1.24 in 2001/02 and butter declined from $1.63 per pound to $1.17. The price of nonfat dry milk (from the National Agricultural Statistics Service) declined from $1.00 per pound to $0.91, as USDA reduced the purchase price of nonfat dry milk and raised the purchase price of butter to slow the accumulation of nonfat dry milk stocks. With product prices declining, the all-milk price fell to $12.74 per cwt in 2001/02, 12 percent below the 2000/01 level of $14.51 per cwt.

The price situation for this marketing year has been weaker, as milk production has increased, use remained weak and stocks of manufactured products reached a record high. Cheese prices are forecast to average $1.12 per pound, butter $1.07 per pound, and nonfat dry milk $0.83 per pound. The all-milk price is forecast to average $11.30 per cwt in 2002/03 with some seasonal increase as the summer progresses.

With cow numbers beginning to decline, modest increases in productivity expected, a stronger economy predicted by fall and improving commercial use, prices for cheese and butter in 2003/04 are projected to rise. However, given the weak demand and the sizeable imbalances in the market, price increases will likely be gradual. The all-milk price for 2003/04 is projected in a range of $11.05–12.05 per cwt.

International Markets Tightening

International dairy markets have tightened because of smaller supplies from Oceania at the end of their production season. New Zealand and Australia have had dry conditions and weak milk

production at the start of 2003, leaving them with below-normal supplies of products to ship in coming months. With tighter supplies, international prices of nonfat dry milk rose to near the level of U.S. domestic prices during the last quarter of 2002. The European Union (EU) recently boosted their subsidy rate to offset the strength of the euro. During 2002/03 and 2003/04, international nonfat dry milk prices will probably be about 15-20 percent higher than during 2001/02, when prices were nearly $1,400 per metric ton or about 63 cents per pound.

International butter markets have been fairly weak and probably will stay so. Increased import demand from Russia caused some price increases last autumn but that has since dissipated. Uncertainties in the Middle East have hurt demand in that region.

In 2001/02, the United States exported about 4 million pounds of cheese and 164 million pounds of nonfat dry milk under the Dairy Export Incentive Program (DEIP). In addition to cheese and nonfat dry milk, the United States is exporting butter under DEIP in 2002/03. Export sales under DEIP have reached the World Trade Organization (WTO) limits of 68,201 metric tons for nonfat dry milk and 3,030 metric tons for cheese. Thus far, 5,000 tons of the WTO limit of 21,097 tons for butter have been approved for export under DEIP.

U.S. dairy imports in 2001/02 declined about 3 percent on a milkfat basis. U.S. prices weakened more than international prices, reducing high-tariff imports. Imports are expected to decline 2-4 percent in 2002/03 and 2003/04.

MPC Imports Stabilizing

Perhaps the most attention-grabbing trade issue for dairy is imports of milk protein concentrates (MPC) and their implication for U.S. prices. U.S. imports of milk protein concentrate, classification number 0404.90.10 of the Harmonized Tariff Schedule, grew from 805 metric tons in 1990, to 7,288 metric tons in 1995, and peaked at 52,928 metric tons in 2000. Milk protein concentrate imports declined to 28,469 metric tons in 2001, as the world market for dairy products tightened. In 2002, U.S. imports of MPC were 35,000 metric tons. Thus far in 2003, imports have been averaging about 3,000 metric tons per month, equivalent to a 36,000-ton annual rate, similar to 2002 and well below the peak year of 2000.

MPC ranges from 40 to 90 percent protein and 1 metric ton equals 2,204 pounds. Using that range, the amount of milk protein imported in the form of MPC is estimated at 31-69 million pounds in 2002. A pound of nonfat dry milk is about 33 percent protein, so MPC imports were equivalent to 94-210 million pounds of nonfat dry milk, on a protein basis, and equal to 0.6-1.4 percent of the U.S. production of milk protein in 2002. USDA purchased about 684 million pounds of nonfat dry milk under the milk price support program in 2002, far more than the volume of nonfat dry milk imported in the form MPC. MPC imports, to the extent that they replaced the protein from nonfat dry milk in commercial products, caused CCC purchases of nonfat dry milk to be higher than they would have been in the absence of the imports. However, CCC purchases still would have been considerable.

USDA Programs Make Substantial Contributions to Support the Dairy Farm Economy

Over the past year, USDA has announced several actions to help bring balance to dairy markets and help stabilize the incomes of dairy producers. Specifically, USDA announced actions affecting imports of American-type cheese, the Milk Price Support Program, the use of surplus nonfat dry milk (NDM) for humanitarian foreign assistance, the Dairy Export Incentive Program (DEIP) as

described above, the Milk Income Loss Contract (MILC) program, and the Livestock Compensation Program (LCP).

In mid-November 2002, USDA announced that it was applying the volume-based WTO safeguard duty to above-quota imports of American-type cheese. Under the Uruguay Round Agreement on Agriculture, the United States is entitled to apply an additional duty on imports of American-type cheese when imports exceed a specified trigger. Imports of American-type cheese exceeded the trigger level and the duty was raised by $0.16 per pound to its maximum permissible level of $0.64 per pound.

The Farm Security and Rural Investment Act of 2002 extended the Milk Price Support Program and authorized a new payment program for dairy producers, the MILC program. The MILC program is retroactive to December 2001 and is authorized through September 30, 2005. Under the MILC program, dairy operations are eligible to receive direct payments on up to 2.4 million pounds of milk production (about 135 cows) each fiscal year. The payment rate under the MILC program equals $16.94 less the Class I milk price in Boston times 0.45.

In 2002, the average payment rate under the MILC program was $1.21 per cwt. Payments as of May 9, 2003 had reached nearly $1.4 billion. Payments are expected to reach $2.4 billion by the end of this fiscal year. These payments offset about 40 percent of the 2002 decline in milk prices from 2001 for producers producing less than 2.4 million pounds and offset, on average, about 25 percent of the decline in milk prices across all producers nationwide. For 2003, if the payment under the MILC program is added to the projected all-milk price, dairy producers producing less than 2.4 million pounds could receive over $12.85 per cwt. for their milk in 2003, which is only 6 percent below the ten-year average all-milk price.

The MILC Program has been providing a level of support similar to that of the former Northeast Interstate Dairy Compact (the Compact). For New England producers producing less than 2.4 million pounds, the new MILC program provides greater compensation than the Compact. Over the period in which the Compact operated, July 1997 through September 2001, payments to producers averaged $16.94 minus the Class I price in Boston times 0.42, rather than 0.45 under the MILC program. Compared with the Compact, the MILC program increases the level of compensation to New England producers by about 7 percent.

Under the Milk Price Support Program, USDA supports the price of milk at the mandated level of $9.90 per cwt. by purchasing cheese, butter, and nonfat dry milk. USDA has purchased 10 million pounds of butter since purchases most recently began in January 2003, the first butter purchases since 1994. USDA has purchased 33 million pounds of cheese during 2002/03, compared with 5 million during all of 2001/02 and very little in the immediately preceding years. However, USDA has been purchasing large and growing amounts of nonfat dry milk. In 2001/02, USDA purchased 619 million pounds of nonfat dry milk, up from 418 million pounds purchased the year earlier. In 2002/03, purchases are forecast at 580 million pounds. At the end of FY 2001/02, USDA's inventory of nonfat dry milk reached 1.3 billion pounds, the largest stockpile since the mid-1980s and equivalent to nearly two years of commercial disappearance. The inventory currently stands at 1.245 billion pounds.

To help reduce inventory of nonfat dry milk, USDA has undertaken several initiatives. In August 2002, USDA implemented the Cattle Feed Program using nonfat dry milk as a protein source in supplemental feed to assist livestock operators in the states most severely stricken by drought. This

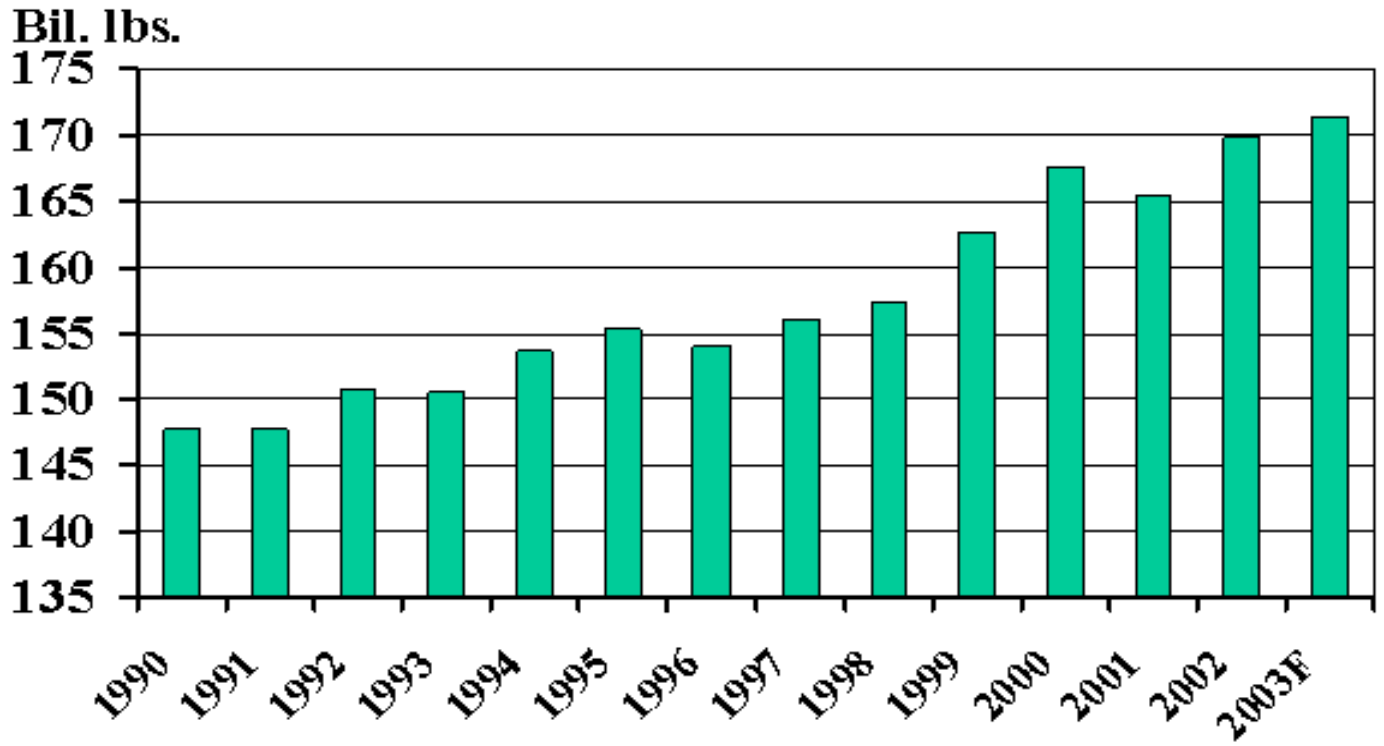
program used about 250 million pounds of nonfat dry milk. In recent months, USDA has made nonfat dry milk held in storage available for domestic production of casein, which is not currently produced in the United States but imported in large quantities. USDA is also accepting proposals from U.S. private voluntary organizations and the World Food Program that will use nonfat dry milk for foreign humanitarian assistance. About 80,000 tons of nonfat dry milk are expected to be used for humanitarian assistance this year. USDA also initiated in April 2003 a Livestock Feed Program to provide nonfat dry milk to livestock producers in 9 states most seriously affected by drought in 2003. Potentially up to 220 million pounds of nonfat dry milk are expected to be used in this program. Lastly, USDA reduced the purchase price of nonfat dry milk and raised the purchase price of butter to better balance the markets for these two products.

Despite the efforts to move nonfat dry milk through various channels in ways that do not disrupt traditional markets here or abroad, government stocks of nonfat dry milk remain at the their highest level since the mid-1980s. Fortunately, as a result of the distribution programs and the changes in purchase price levels, the price support program is now supporting milk prices through the purchase of all three manufactured products.

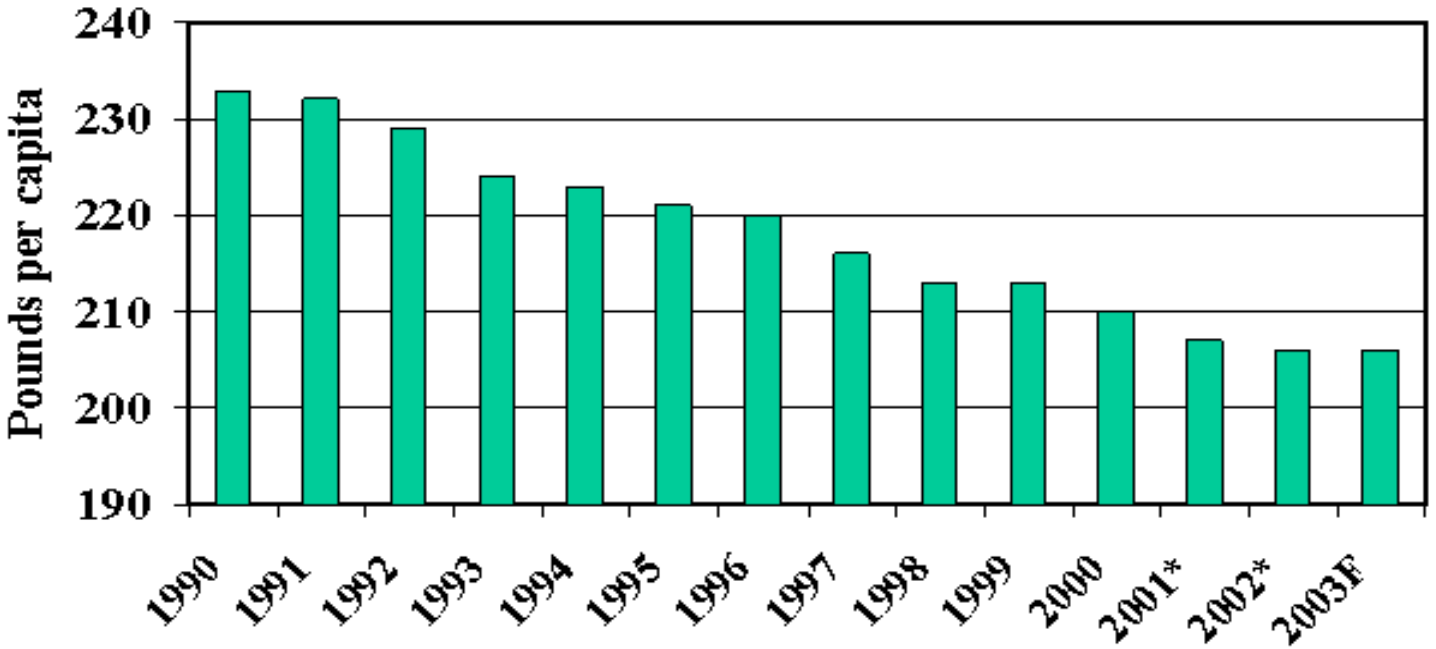
USDA has been very attentive to the situation in milk markets and has taken aggressive actions using our full range of authority provided by Congress. We have been mindful to the effect these actions have on commercial purchasers and taxpayers as well as producers. While farm-level milk prices are down sharply, programs administered through USDA will offset much of the drop in milk prices and producer incomes. While these actions will help provide near term financial assistance to dairy producers, they also risk extending the downturn in dairy prices, as producers may be encouraged to maintain or even increase production.

That completes my comments, Mr. Chairman and I would be pleased to respond to questions from you and the Members.

1--Milk Production Rises Sharply in 2002; Another Increase Expected in 2003

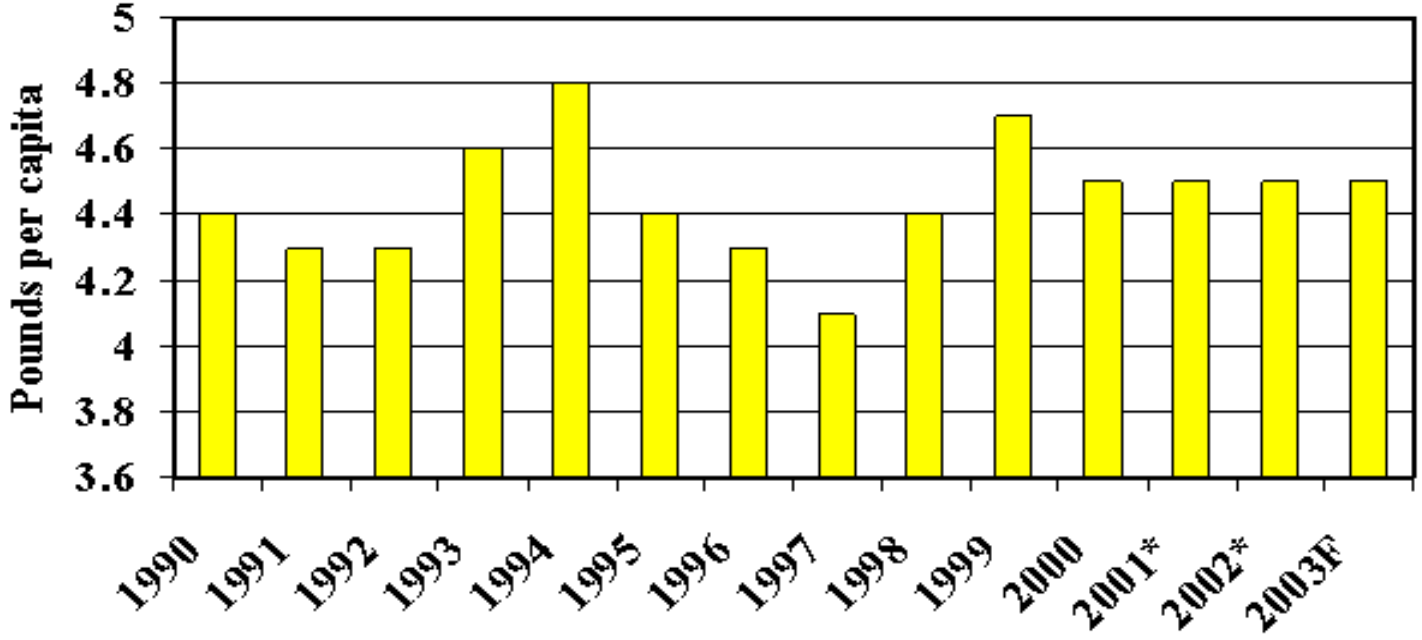


2--Per Capita Fluid Milk Consumption Continues Downtrend



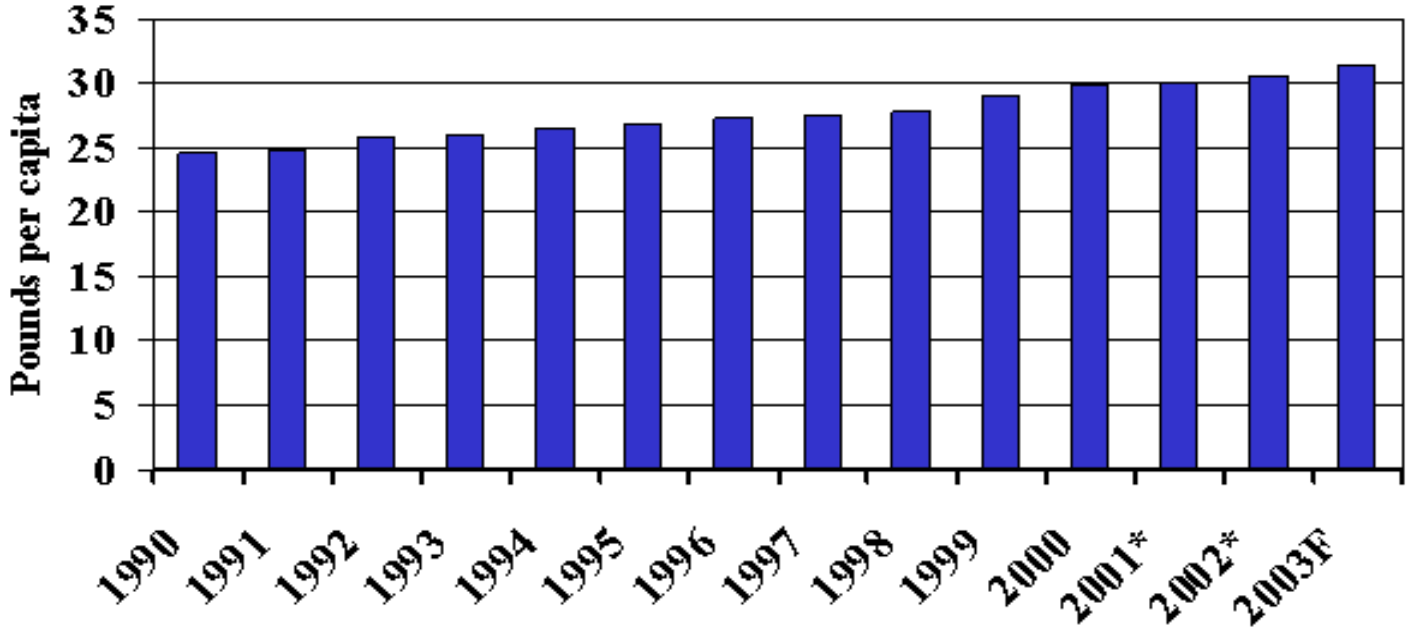
*Preliminary

3--Per Capita Butter Consumption has been Flat



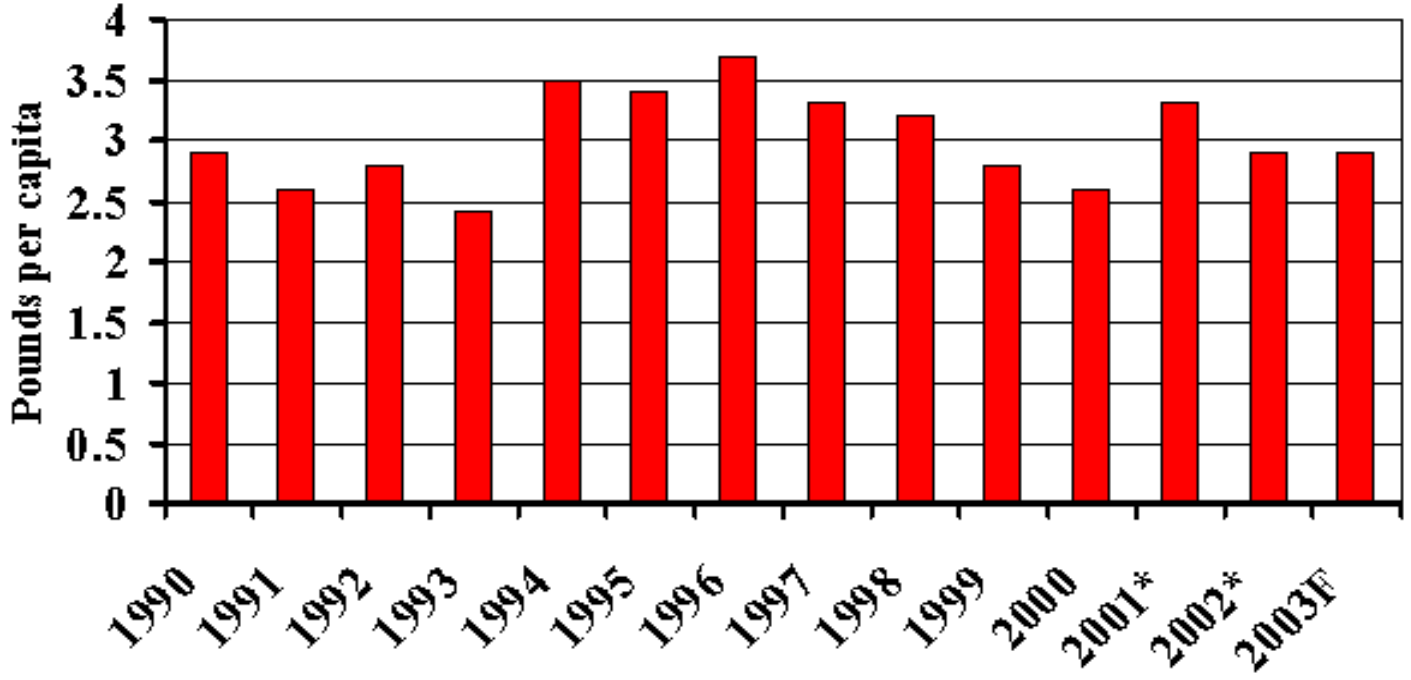
*Preliminary

4--Per Capita Cheese Consumption has been a Growth Market



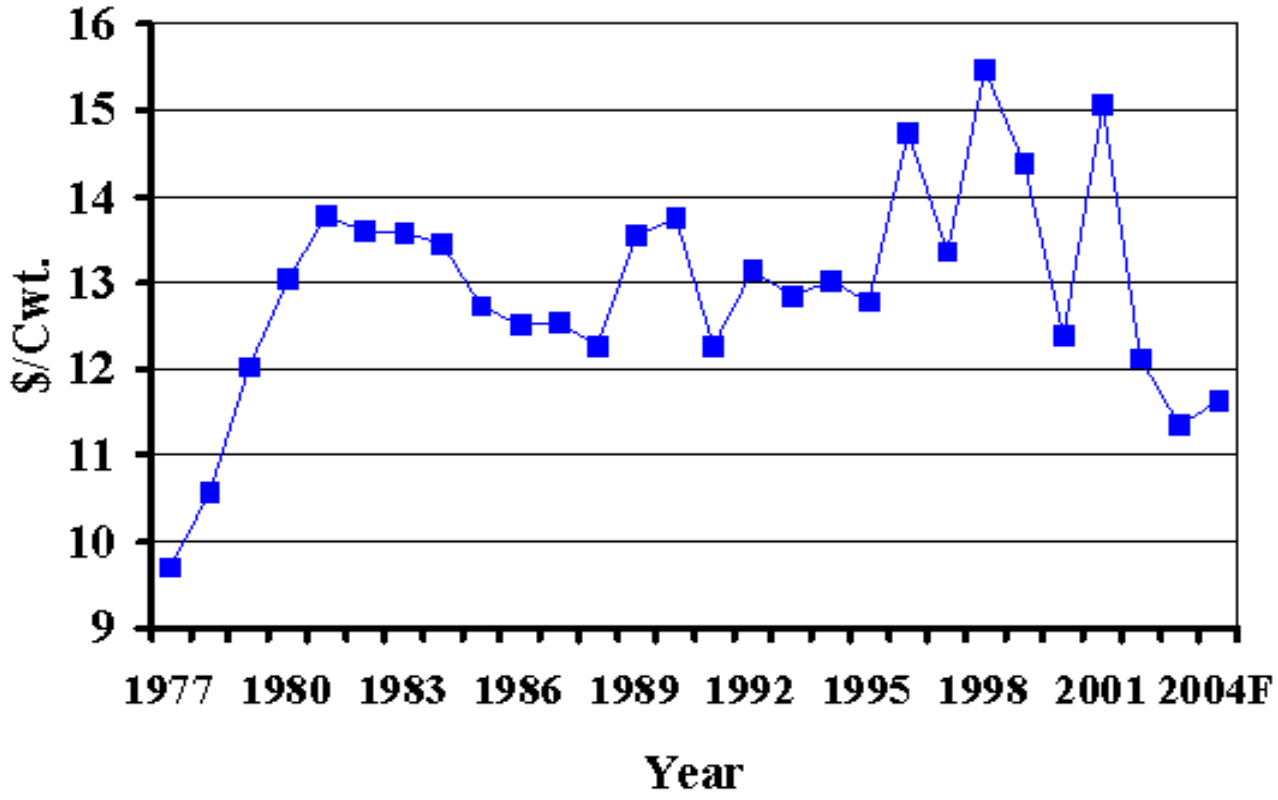
*Preliminary

5--Per Capita Nonfat Dry Milk Use Variable

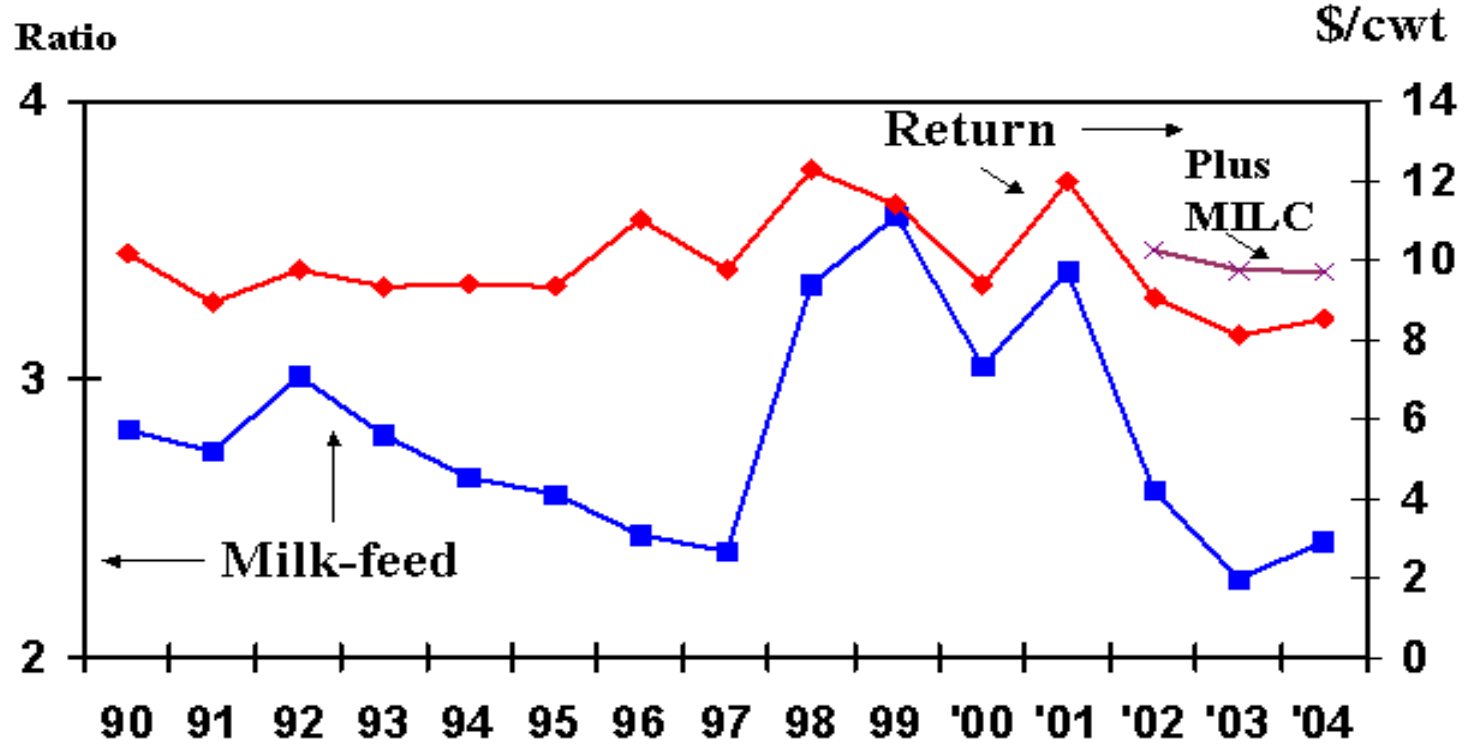


*Preliminary

6--All-milk Price Drops Again in 2003 with Gradual Recovery by 2004

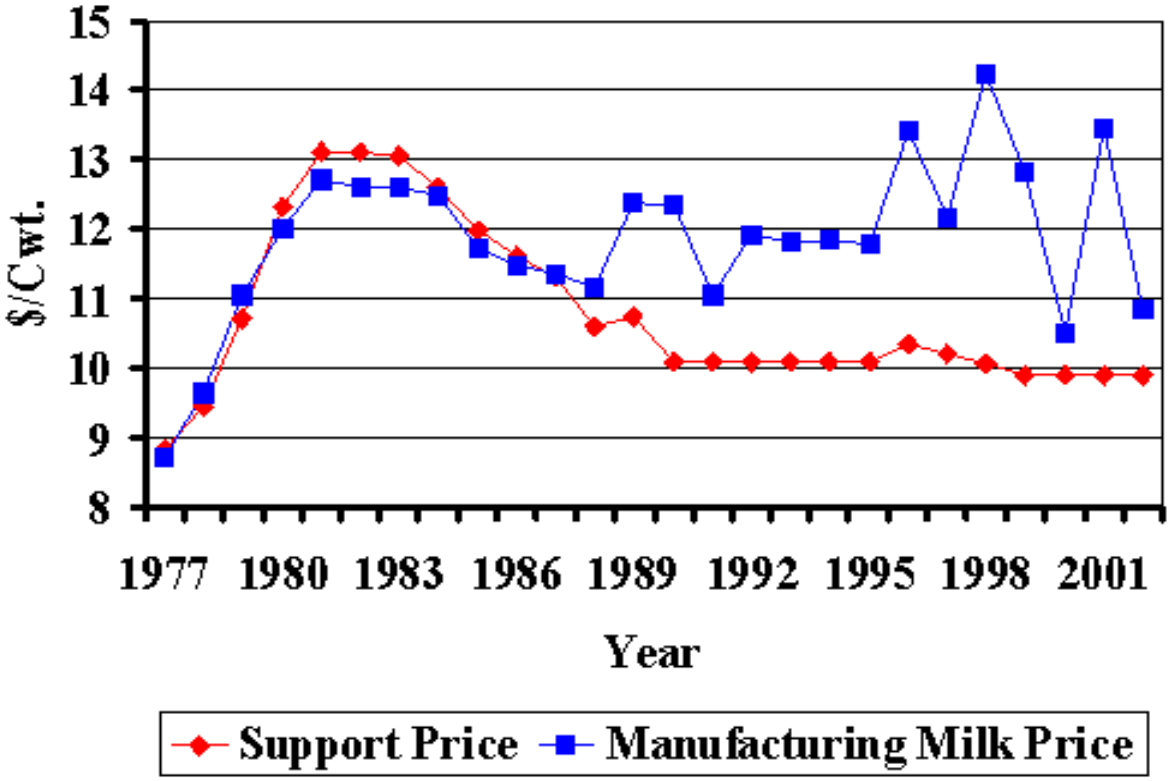


7--Milk-feed Price Ratio and Returns Down, but MILC Cushions the Drop 1/

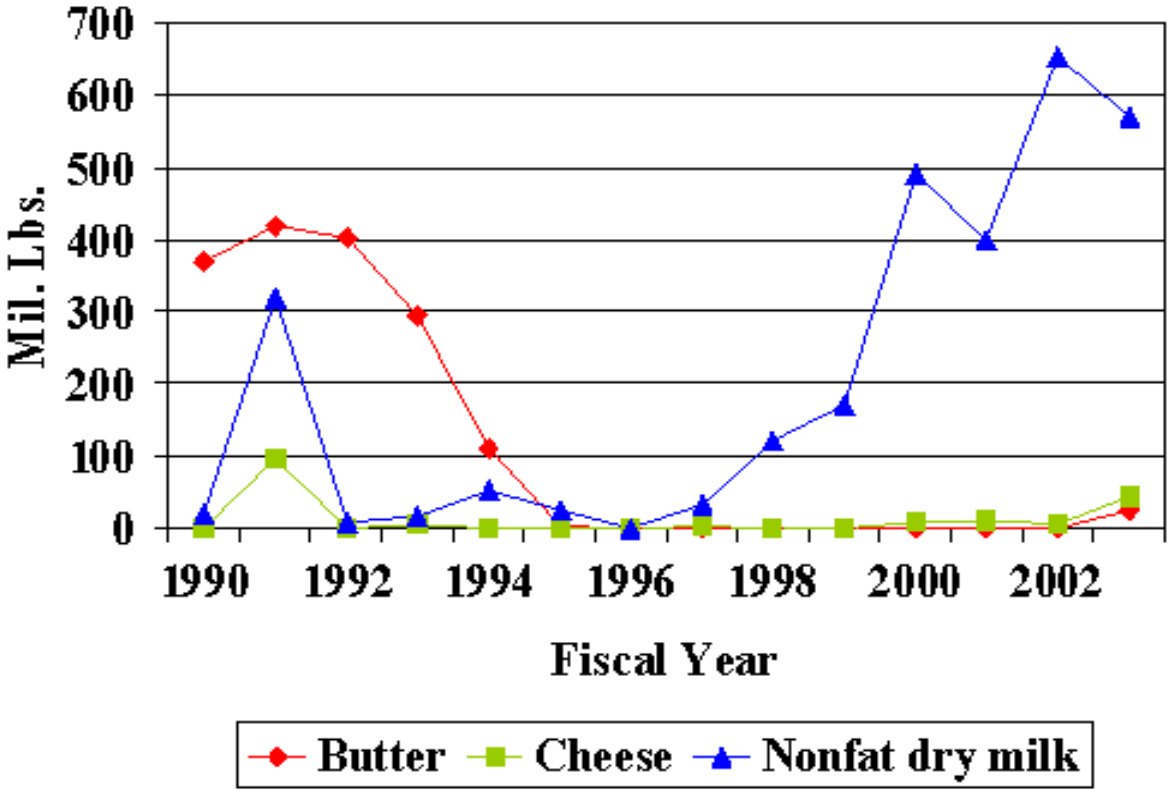


1/ Return over concentrate cost; MILC assumes no limit

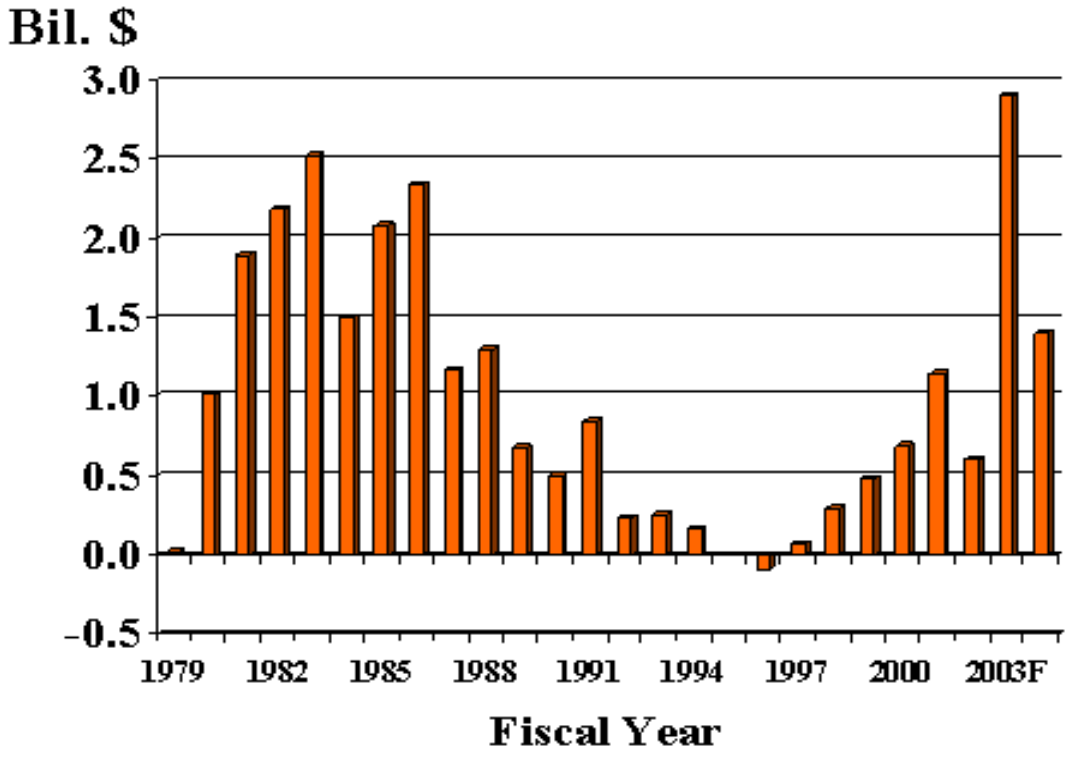
8--Price Variability Higher in Recent Years



9--Purchases of NFDM Continue at Strong Pace & Begin for Other Products



10--Milk Price and Income Support Program Costs Up Sharply 1/



1/ FY 2003 & 2004 from President's Budget for FY 2004